

ABSTRACT

5 There is provided an improved process for preparing cefixime. Thus, for example, 7-amino-3-vinyl-3-cephem-4-carboxylic acid is reacted with 2-mercaptop-1,3-benzothiazolyl-(Z)-2-(2-aminothiazol-4-yl)-2-(methoxycarbonyl)-methoxyimino acetate in tetrahydrofuran and water at 4⁰C in the presence of triethylamine. The reaction mass is extracted with ethyl acetate. 7-[2-(2-Amino-10 4-thiazolyl)-2-(methoxycarbonylmethoxyimino)acetamido]-3-vinyl-3-cephem-4-carboxylic acid triethylamine salt present in the aqueous layer is hydrolyzed with sodium hydroxide in less than 30 minutes and aqueous hydrochloric acid is added immediately to adjust the pH to 4.8 to 5.2. Then, aqueous hydrochloric acid is added at 35⁰C to adjust the pH 2.5 and cooled to crystallize cefixime
15 trihydrate in high purity.